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09/866,502	05/25/2001	Frederick Robert Chang	SBC-0101	4455

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EXAMINER

JACOBS, LASHONDA T

ART UNIT

PAPER NUMBER

2157

DATE MAILED: 09/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/866,502	Applicant(s) CHANG ET AL.	
	Examiner LaShonda T Jacobs	Art Unit 2157	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
 - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
 - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
 - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 25 May 2001.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-36 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-36 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>4/24/02</u> | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-36 are rejected under 35 U.S.C. 103(a) as being unpatentable over Dutta et al (hereinafter, "Dutta", 2002/0073204) in view of Feigenbaum.

As per claim 1, Dutta discloses a method for improving the reliability of peer-to-peer network downloads, comprising:

- a) initiating a search from a client on a peer-to-peer network (abstract, paragraphs 0007, 0037 and 0044-0045);
- b) receiving a list of servers that satisfy the search (paragraph 0037); and
- c) selecting at least one of the servers from the list of servers (paragraphs 0037 and 0044-0045);

However, Dutta does not explicitly disclose:

- d) selecting one of a plurality of downloading systems based on a predetermined criteria; and
- e) downloading a file using one of the plurality of downloading systems.

In an analogous art, Feigenbaum discloses a multi-server file download including:

- d) selecting one of a plurality of downloading systems based on a predetermined criteria (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

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e) downloading a file using one of the plurality of downloading systems (col. 3, lines 16-38).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of a file in a timely and efficient manner.

As per claim 2, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (d) further includes the step of:
d1) selecting a multiple concurrent download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) selecting a multiple concurrent download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of a file in a timely and efficient manner.

As per claim 3, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (d) further includes the step of:
d1) selecting a multiple concatenated download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) selecting a multiple concatenated download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of a file in a timely and efficient manner.

As per claim 4, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (d) further includes the step of:

d1) selecting a serial concatenated download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) selecting a serial concatenated download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of a file in a timely and efficient manner.

As per claim 5, Dutta discloses wherein step (d) further includes the step of:

d1) determining a connection speed to the at least one of the servers (paragraphs 0035 and 0065).

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As per claim 6, Dutta discloses wherein step (d) further includes the step of:

d1) comparing a connection speed to the at least one of the servers to an available bandwidth (paragraphs 0035, 0045 and 0065).

As per claim 7, Dutta discloses wherein step (a) further includes the steps of:

a1) entering a text string (paragraph 0037).

As per claim 8, Dutta discloses wherein step (a) further includes the step of:

a1) entering a unique key (paragraph 0041).

As per claim 9, Dutta discloses wherein step (a) further includes the step of:

a1) broadcasting a search query to the peer-to-peer network (paragraph 0037).

As per claim 10, Dutta discloses wherein step (a) further includes the step of:

a1) transmitting a search query to a central server (paragraphs 0036-0037).

As per claim 11, Dutta discloses wherein step (b) further includes the step of:

b1) receiving a document name (paragraph 0045).

As per claim 12, Dutta discloses wherein step (b) further includes the step of:

b1) receiving a file size (paragraph 0044).

As per claim **13**, Dutta discloses wherein step (b) further includes the step of:

b1) receiving a source node for a file (paragraphs 0044-0045).

As per claim **14**, Dutta discloses wherein step (b) further includes the step of:

b1) receiving an available bandwidth at a server (paragraph 0045).

As per claim **15**, Dutta discloses a method of improving the reliability of peer-to-peer network downloads, comprising the steps of:

a) originating a search from a client on a peer-to-peer network (abstract, paragraphs 0007, 0037 and 0044-0045);

b) broadcasting a search query over the peer-to-peer network (paragraph 0037);

c) receiving a list of servers and a list of associated document names that satisfy the search query (paragraph 0037);

d) selecting at least one of the servers from the list of servers (paragraphs 0037 and 0044-0045);

However, Dutta does not explicitly disclose:

e) determining one of a plurality of downloading systems based on a predetermined criteria ; and

f) downloading a file.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d) determining one of a plurality of downloading systems based on a predetermined criteria (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

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e) downloading a file (col. 3, lines 16-38).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of a file in a timely and efficient manner.

As per claim 16, Dutta discloses wherein step (a) further includes the step of:

a1) entering a unique key that identifies the file (paragraph 0041).

As per claim 17, Dutta discloses wherein step (c) further includes the step of:

c1) receiving a file size, a source node and a unique key (paragraphs 0041 and 0044).

As per claim 18, Dutta discloses wherein step (d) further includes the step of:

d1) measuring a connection speed to a plurality of servers (paragraphs 0035 and 0065);

d2) comparing the connection speed of the plurality of servers to an available bandwidth to the client (paragraphs 0035, 0045 and 0065).

As per claim 19, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (e) further includes the steps of:

e1) determining if an available bandwidth is less than a connection speed to two of the servers;

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e2) when the available bandwidth is less than the connection speed to two of the servers, selecting a serial concatenated download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

e1) determining if an available bandwidth is less than a connection speed to two of the servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

e2) when the available bandwidth is less than the connection speed to two of the servers, selecting a serial concatenated download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 20, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose the steps of:

e3) when the available bandwidth is not less than the connection speed to two of the servers, selecting a multiple concurrent download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

e3) when the available bandwidth is not less than the connection speed to two of the servers, selecting a multiple concurrent download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 21, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose the steps of:

e3) when the available bandwidth is not less than the connection speed to two of the servers, selecting a multiple concatenated download system.

In an analogous art, Feigenbaum discloses a multi-server file download including:

e3) when the available bandwidth is not less than the connection speed to two of the servers, selecting a multiple concatenated download system (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 22, Dutta discloses wherein step (c2) further includes the steps of:

i) starting a download from one of the list of servers (paragraphs 0044-0045 and 0049).

However, Dutta does not explicitly disclose:

ii) if the one of the list of servers is interrupted during the download, selecting a second of the list of server to start a download;

iii) requesting the download to start at a next byte after a last received byte.

In an analogous art, Feigenbaum discloses a multi-server file download including:

ii) if the one of the list of servers is interrupted during the download, selecting a second of the list of server to start a download (col. 2, lines 52-65, col. 3, lines 56-67 and col. 4, lines 1-9);

iii) requesting the download to start at a next byte after a last received byte (col. 2, lines 52-65).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was to modify Dutta by including a start byte for the download allowing a client to download different portions of a file in a timely and efficient manner.

As per claim 23, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (e3) further includes the steps of:

i) starting a download from at least two of the servers;
ii) if any of the at least two of the servers finishes the download, terminating the download for any other servers.

In an analogous art, Feigenbaum discloses a multi-server file download including:

i) starting a download from at least two of the servers (col. 2, lines 52-65, col. 3, lines 56-67 and col. 4, lines 1-9);

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ii) if any of the at least two of the servers finishes the download, terminating the download for any other servers (col. 2, lines 52-65, col. 3, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was to modify Dutta by including a start byte for the download allowing a client to download different portions of a file in a timely and efficient manner.

As per claim 24, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (e3) further includes the steps of:

- i) starting a first download at a first byte of the file for one of the at least two servers;
- ii) starting a second download at a second byte of the file for a second of the at least two servers;
- iii) determining when a complete file has been downloaded by combining the first download and the second download.

In an analogous art, Feigenbaum discloses a multi-server file download including:

- i) starting a first download at a first byte of the file for one of the at least two servers (col. 2, lines 52-65, col. 3, lines 56-67 and col. 4, lines 1-9);
- ii) starting a second download at a second byte of the file for a second of the at least two servers (col. 2, lines 52-65, col. 3, lines 56-67 and col. 4, lines 1-9); and
- iii) determining when a complete file has been downloaded by combining the first download and the second download (col. 2, lines 52-67).

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Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was to modify Dutta by including a start byte for the download allowing a client to download different portions of a file in a timely and efficient manner.

As per claim **25**, Dutta discloses a method of operating a peer-to-peer network comprising the steps of:

- a) initiating a search from a first peer to the peer-to-peer network (abstract, paragraphs 0007, 0037, and 0044-0045);
- b) receiving a list of peer servers that meet a search query (paragraph 0037); and
- c) selecting one of a plurality of downloading systems based on a predetermined criteria (paragraphs 0037 and 0044-0045).

However, Dutta does not explicitly disclose:

- d) downloading a file using the one of the plurality of downloading systems.

In an analogous art, Feigenbaum discloses a multi-server file download including:

- d) downloading a file using the one of the plurality of downloading systems (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems in order to allow a client to download different portions of file in a timely and efficient manner.

As per claim **26**, Dutta discloses wherein step (c) further includes the steps of:

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c1) determining a connection speed to each of the peer servers on the list of peer servers (paragraph 0035);

c2) selecting a subset of the list of peer servers based on the connection speed (paragraph 0035).

As per claim 27, Dutta discloses wherein step (c1) further includes the step of:

i) receiving a test file from each of the servers on the list of servers (paragraph 0050).

As per claim 28, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein step (c1) further includes the step of:

i) determining an order of response receipt from each of the servers on the list of servers.

In an analogous art, Feigenbaum discloses a multi-server file download including:

i) determining an order of response receipt from each of the servers on the list of servers (col. 3, lines 42-52).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by ranking servers according to their performance measurements in order to allow a client to download different portions of file in a timely and efficient manner.

As per claim 29, Dutta discloses wherein step (c1) further includes the step of:

i) pingging each of the servers on the list of servers (paragraph 0046).

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As per claim 30, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein the step (d) further includes the steps of:

d1) when an available bandwidth is less than a two times a connection speed, selecting a server with a fastest connection speed; and

d2) starting a download from the server with the fastest connection speed.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) when an available bandwidth is less than a two times a connection speed, selecting a server with a fastest connection speed (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

d2) starting a download from the server with the fastest connection speed (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 31, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein the step (d) further includes the steps of:

d3) determining if the server with the fastest connection speed had an error before the file was downloaded;

d4) when the server with the fastest connection speed had an error before the file was downloaded, selecting a second server;

d5) determining a last byte received; and

d6) transmitting download starting from a next byte command to a second server.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d3) determining if the server with the fastest connection speed had an error before the file was downloaded (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

d4) when the server with the fastest connection speed had an error before the file was downloaded, selecting a second server (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

d5) determining a last byte received (col. 2, lines 53-67); and

d6) transmitting download starting from a next byte command to a second server (col. 2, lines 53-67).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 32, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose wherein the step (d) further includes the steps of:

d1) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers; and

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d2) starting a plurality of simultaneous downloads from the plurality of servers.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

d2) starting a plurality of simultaneous downloads from the plurality of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 33, Dutta disclose the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose the steps of:

d3) determining if the client has received a complete version of the file from one of the plurality of servers;

d4) when the client has received a complete version of the file from one of the plurality of servers, terminating a rest of the downloads.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d3) determining if the client has received a complete version of the file from one of the plurality of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

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d4) when the client has received a complete version of the file from one of the plurality of servers, terminating a rest of the downloads (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim 34, Dutta discloses the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose the steps of:

d1) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers; and

d2) starting a plurality of simultaneous offset downloads from the plurality of servers.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d1) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

d2) starting a plurality of simultaneous offset downloads from the plurality of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of

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downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim **35**, Dutta disclose the invention substantially as claims discussed above.

However, Dutta does not explicitly disclose the step of:

d3) when a complete file can be formed from the plurality of simultaneous offset downloads, constructing a complete file.

In an analogous art, Feigenbaum discloses a multi-server file download including:

d3) when a complete file can be formed from the plurality of simultaneous offset downloads, constructing a complete file (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

As per claim **36**, Dutta discloses a method of operating a peer-to-peer network comprising the steps of:

a) initiating a search from a first peer to the peer-to-peer network (abstract, paragraphs 0007, 0037 and 0044-0045) ;

b) receiving a list of peer servers, a plurality of associated file names, a plurality of file sizes, a plurality of bandwidths and a plurality of source nodes that meet a search query (paragraphs 0037, and 0044-0045);

c) determining a connection speed to each of the peer servers on the list of peer servers (paragraph 0035);

d) selecting a subset of the list of peer servers based on the connection speed (paragraph 0035);

However, Dutta does not explicitly disclose:

e) when an available bandwidth is less than a two times the connection speed, selecting a server with a fastest connection speed;

f) starting a download from the server with the fastest connection speed;

g) determining if the server with the fastest connection speed had an error before the file was downloaded;

h) when the server with the fastest connection speed had an error before the file was downloaded, selecting a second server;

i) determining a last byte received;

j) transmitting a download starting from a next byte command to a second server;

k) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers;

l) starting a plurality of simultaneous downloads from the plurality of servers;

m) determining if the client has received a complete version of the file from one of the plurality of servers; and

n) when the client has received a complete version of the file from one of the plurality of servers, terminating a rest of the downloads.

In an analogous art, Feigenbaum discloses a multi-server file download including:

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- e) when an available bandwidth is less than a two times the connection speed, selecting a server with a fastest connection speed (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- f) starting a download from the server with the fastest connection speed (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- g) determining if the server with the fastest connection speed had an error before the file was downloaded (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- h) when the server with the fastest connection speed had an error before the file was downloaded, selecting a second server (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- i) determining a last byte received (col. 2, lines 53-67);
- j) transmitting a download starting from a next byte command to a second server (col. 2, lines 53-67);
- k) when an available bandwidth is not less than a two times a connection speed, selecting a plurality of servers from the list of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- l) starting a plurality of simultaneous downloads from the plurality of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9);
- m) determining if the client has received a complete version of the file from one of the plurality of servers (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9); and

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n) when the client has received a complete version of the file from one of the plurality of servers, terminating a rest of the downloads (col. 3, lines 22-38, lines 56-67 and col. 4, lines 1-9).

Given the teaching of Feigenbaum, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Dutta by including a plurality of downloading systems allowing a client to select a download system in order to transfer different portions of a file in a timely and efficient manner.

Conclusion

3. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

U.S. Pub. No. 2002/0073075 to Dutta et al

U.S. Pub. No. 2002/0138471 to Dutta et al

U.S. Pub. No. 2002/0138744 to Schleicher et al

U.S. Pat. No. 6,049,892 to Casagrande et al

Any inquiry concerning this communication or earlier communications from the examiner should be directed to LaShonda T Jacobs whose telephone number is 703-305-7494.

The examiner can normally be reached on 8:30 A.M.-5:00 P.M..


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ario Etienne can be reached on 703-308-7562. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

LaShonda T Jacobs
Examiner
Art Unit 2157

ltj
September 17, 2004


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